

June 22, 2006

In Re Apln. of:

WILLIAM D. DENISON, ET AL.

Ser. No.:

10/807,936

Filed on:

March 24, 2004

For:

**ELECTRONIC ACCESS CONTROL** 

DEVICE

Docket No.:

MET-041424C004

### CERTIFICATE OF MAILING BY EXPRESS MAIL

Express Mail Mailing Label No. EV 818256771 US

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Gerianne M. Flannery

orney Docket No. MET-041424C004 IN THE UNITED STATES PATENT AND TRADEMARK OFFICE re Application of: William D. Denison et al. Examiner: Brian A. Zimmerman Application No. 10/807,936 Art Unit: 2635 Confirmation No. 5149

For: ELECTRONIC ACCESS CONTROL DEVICE

# TRANSMITTAL OF APPEAL BRIEF (PATENT APPLICATION – 37 C.F.R. § 41.37)

MAIL STOP APPEAL BRIEF - PATENTS Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

Filed: March 24, 2004

- 1. Transmitted herewith, in triplicate, is the APPEAL BRIEF in this application, with respect to the Notice of Appeal filed on April 24, 2006.
- 2. This application is on behalf of a small entity.
- Petition for a Four Month Extension of Time is also being submitted. 3.
- A check in the amount of \$570.00 for payment of the four month extension fee (\$795.00 -4. \$225.00 previously paid on April 24, 2006 for two month extension of time).
- Pursuant to 37 C.F.R. § 41.20(b)(2), the fee for filing the Appeal Brief is \$250.00 for a 5. small entity.
- The total fee due is \$250.00 for a small entity. 6.
- Attached is a check in the amount of \$250.00. Should any other fees be required, please 7. charge Deposit Account No. 50-0545.

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8. Applicant believes that no extension of term is required. However, this conditional petition is being made to provide for the possibility that applicant has inadvertently overlooked the need for a petition and fee for extension of time. If any additional extension and/or fee is required, please charge Deposit Account No. 50-0545.

Respectfully submitted,

1

Date: June 22, 2006

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Gerianne M. Flannery

## Practitioner's Docket No. MET-041424C004

### IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

In re application: William D. Denison et al.

Application No.: 10/807,936 Art Unit: 2635

Filed: March 24, 2004 Examiner: Brian A. Zimmerman

For: ELECTRONIC ACCESS CONTROL DEVICE

Mail Stop Appeal Briefs-Patents Commissioner for Patents P.O. Box 1450 Alexandria, VA 22313-1450

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## **APPEAL BRIEF (37 C.F.R. § 41.37)**

This brief is in furtherance of the Notice of Appeal filed in this case on April 24, 2006.

The fees required under § 41.20, and any required petition for extension of time for filing this brief and fees therefore, are dealt with in the accompanying TRANSMITTAL OF APPEAL BRIEF.

### I. REAL PARTY IN INTEREST

The real party in interest in this appeal is: Micro Enhanced Technology, Inc., the assignee.

### II. RELATED APPEALS AND INTERFERENCES

With respect to other appeals or interferences that will directly affect, or be directly affected by, or have a bearing on the Board's decision in this appeal: there are appeals currently pending for related U.S. Patent Application Serial No. 10/807,935, filed March 24, 2004, and U.S. Patent Application Serial No. 10/885,998, filed July 7, 2004.

#### III. STATUS OF CLAIMS

The status of the claims in this application are:

### A. TOTAL NUMBER OF CLAIMS IN APPLICATION

Claims in the application are: 1-65.

#### **B. STATUS OF ALL THE CLAIMS**

Claims 1-65 are rejected.

#### C. CLAIMS ON APPEAL

The Claims on appeal are: 1-65.

#### IV. STATUS OF AMENDMENTS

All cancellations and amendments filed subsequent to final rejection have been entered.

#### V. SUMMARY OF CLAIMED SUBJECT MATTER

The independent claims involved in this appeal are claims 1, 9, 15 and 23. A brief discussion of these independent claims is provided below with cites to the originally filed application to enable the Board to more quickly determine where the claimed subject matter is described in the specification. Applicants assert that the below cites are not all inclusive, and reserves the right to provide additional cites, if needed.

Independent claim 1 is generally directed to an electronic access control device. The device has a circuit having portion that is deactivated during a first time period and enabled during a second time period. p. 17, ln. 32 – p. 22, ln. 16. The portion of the circuit also has an enable output signal generated in response to a sensed electromagnetic signal and the portion of the circuit is enabled for an extended time period that is greater than the second time period. p. 17, ln. 32 - p. 22, ln. 16. Moreover, the portion of the circuit has an input code output generated in response to the electromagnetic signal and during the extended time period. p. 17, ln. 32 - p. 22, ln. 16. Further, a microprocessor has an unlock output signal that is generated if the input code matches an access code. p.

17, ln. 32 - p. 22, ln. 16. Still further, an electromechanical driver has an output signal that is generated in response to the unlock signal. p. 17, ln. 32 - p. 22, ln. 16.

Independent claim 9 is generally directed to an apparatus having four circuits and an electromechanical driver. The first circuit has an oscillator with a first circuit output signal. p. 17, ln. 32 - p. 22, ln. 16. The second circuit is enabled and disabled in response to the first circuit output and has a second circuit output signal that is generated in response to the receipt of an electromagnetic signal. p. 17, ln. 32 - p. 22, ln. 16. The third circuit is temporarily enabled during the receipt of the electromagnetic signal and has a third circuit output signal comprising an input code generated in response to receipt of the electromagnetic signal. p. 17, ln. 32 - p. 22, ln. 16. The fourth circuit is temporarily enabled to compare the input code to an access code. p. 17, ln. 32 - p. 22, ln. 16. Further, the electromechanical driver has an output that is provided to an unlock device if the input code matches the access code. p. 17, ln. 32 - p. 22, ln. 16.

Independent claim 15 is generally directed to an apparatus having an oscillator, a circuit, a microprocessor, and a switch. The oscillator has an output comprising a plurality of duty cycles. p. 17, ln. 32 - p. 22, ln. 16. The circuit is periodically enabled for a time  $t_1$  and disabled for a time  $t_2$  during at least some of the duty cycles and wherein a portion of the circuit generates an input code in response to an electromagnetic signal. p. 17, ln. 32- p. 22, ln. 16. Further, the microprocessor compares the input code to an access code. p. 17, ln. 32- p. 22, ln. 16. Also, the switch enables the portion of the circuit as the input code is being received for a time  $t_3$  that is greater than the time  $t_1$ . p. 17, ln. 32 - p. 22, ln. 16.

Independent claim 23 is generally directed to a circuit operating on current drained from a battery. The circuit has an electronic circuit having an output that indicates detection of a device capable of providing an electromagnetic signal. p. 17, ln. 32 - p. 22, ln. 16. The circuit also has a decoder that extracts an input code transmitted via the electromagnetic signal. p. 17, ln. 32 - p. 22, ln. 16. Further, the circuit has a switch that, in response to an input, increases the current drained from the battery. p. 17, ln. 32 - p. 22, ln. 16. Moreover, the circuit has an electronic circuit that compares the input code to an access code. p. 17, ln. 32 - p. 22, ln. 16. Another electronic circuit provides an output to an unlock device if the input code matches the access code. Also,

the switch decreases the current drained from the battery after receiving the input code. p. 17, ln. 32 - p. 22, ln. 16.

## VI. GROUNDS OF REJECTION TO BE REVIEWED ON APPEAL

- 1. Claims 1-6, 8-12, 14-20, 22-27, 29, 30, 33-39, 42-48, 51-57 and 60-65 stand rejected under 35 U.S.C. § 103(a) as being unpatentable over Stengel (i.e., U.S. Patent No. 5,109,530) and Lemelson (i.e., U.S. Patent No. 4,354,189).
- 2. Claims 7, 13, 21 and 28 stand rejected under 35 U.S.C. 103(a) as being unpatentable over Stengel and Lemelson and further in view of Stamm (i.e., U.S. Patent No. 4,353,064).
- 3. Claims 31, 32, 40, 41, 49, 50, 58 and 59 stand rejected under 35 U.S.C. 103(a) as being anticipated by Stengel and Lemelson and further in view of the admitted prior art.

### VII. ARGUMENT

## First Ground of Rejection Under 35 U.S.C. § 103(a)

Applicants assert that all claims are allowable over the prior art of record under 35 U.S.C. § 103. Thus, the rejections should be overturned.

When applying 35 U.S.C. §103, a rejection must adhere to several tenets of patent law. These tenets include, among other things: 1) The claimed invention must be considered as a whole; 2) The references must be considered as a whole and must suggest the desirability and thus the obviousness of making the combination; and 3) The references must be viewed without the benefit of impermissible hindsight vision afforded by the claimed invention. MPEP 2141. Furthermore, the level of ordinary skill in the art at the time of the invention should be accessed to maintain objectivity. MPEP 2141.03. Moreover, all claim limitations must be taught or suggested by the prior art. MPEP 2143.03.

The Applicants respectfully assert that these requirements have not been satisfied. Instead, the claims in the current application have been rejected by: 1) using impermissible hindsight to correct for a failing to find a suggestion to combine the references; 2) overlooking the level or ordinary skill in the art; and 3) disregarding the language of the claims. As a result of these errors, the Applicants respectfully request that all claims in the application-at-issue be found allowable.

### A. Teachings of the Cited Prior Art

Generally stated, all of the independent claims (i.e., claims 1, 9, 15 and 23) in the application-at-issue require, among other things, circuitry that is periodically awaken and receives an electromagnetic signal during an extended awake period. Moreover, the input code is compared to an authorization code wherein a signal is provided to unlock a device if the codes match. In contrast, the prior art of record fails to teach or suggest this unique combination.

In Lemelson, a switch and lock activating system and method is disclosed. In one form, a ring is provided with electronic circuit means for generating a code that is wirelessly transmitted. *Lemelson*, Abstract. Moreover, an automatic means is provided for reading the code and causing a door lock to open. *Lemelson*, Col. 1, lns. 19-23. The automatic means is powered by a suitable source of electrical energy. *Lemelson*, Col. 4, lns. 47-52.

However, nothing is disclosed in Lemelson regarding conserving power as claimed by the Applicants in the application-at-issue. In the present application, conservation of battery power is an important objective which is not taken lightly by the Applicants. In contrast, instead of conserving power, "a suitable source" of power in Lemelson is used and described as "a battery or line current, a combination of the two or other means for supplying electrical energy for powering the electronic devices associated with the various components illustrated and described." *Lemelson*, Col. 4, Ins. 47-52.

Accordingly, Lemelson assumes that if more power is needed, then another suitable power source should be sought instead of making attempts to conserve power. Moreover, Lemelson does not provide for enabling a circuit for an extended time period so an input can be received. Thus, Lemelson fails to teach or suggest a receiver that is periodically awaken and, during an extended awake period, receives a signal containing an input code that is compared to an authorization code as currently claimed.

Turning to Stengel, a receiver with a battery saver is disclosed. In an aspect, a method is disclosed for saving battery energy in a portable radio having a receiver for recovering modulated signals modulated on a carrier signal. *Stengel*, Col. 2, Ins. 5-8. "The method includes steps of detecting the presence of a non-valid coded squelch signal, decoding such non-valid squelch signal, and synchronizing the receiver with the detected non-valid coded squelch signal." *Stengel*, Col. 2, Ins. 8-12. "The method further includes the step of placing the portable radio in a battery saver mode. *Stengel*, Col. 2, Ins. 12-14.

In a detailed description of the preferred embodiment, Stengel explains that:

"...the receiver 100 receives, recovers, and decodes a non-valid coded squelch signal (CSS) and goes to sleep after synchronizing with the non-valid CSS. Periodically the receiver 100 wakes up in sync with the non-valid CSS to determine any change in the CSS. If no change in the CSS is determined the receiver 100 goes back to sleep. In the event that a change is determined the battery saver mode is departed and the receiver 100 continues to receive information."

Stengel, Col. 5, line 66 – Col., line 7.

Nothing is disclosed in Stengel regarding the applicability of the battery saver to unlocking devices. Moreover, like Lemelson, Stengel fails to teach or disclose a receiver that is periodically awaken and, during an extended awake period, receives a signal containing an input code that is compared to an authorization code, and providing a signal to unlock a device if the codes match.

Stated another way, with pager devices as taught by Stengel, the person carrying the pager is not required to react to a received signal from an outside source. In contrast, the present invention responds to all received signals by comparing an input code to an access code. Moreover, a pager must be attended by a person before a response to a received signal can be made. Conversely, the present invention does not need a person to perform a responsive task such as comparing an input code to an access code and activating a lock. Accordingly, Stengel fails to teach or suggest many elements of the claimed inventions.

## B. Hindsight in Determining the Desirability in Making Combination

The prior art must suggest the desirability of the claimed invention. *MPEP* 2143.01(I). This requirement prevents the reliance on hindsight reconstruction of the applicant's invention. *MPEP* 2143.01(I). Here, the prior art fails to make any such suggestion. Instead, the suggestion is made only within the application-at-issue by the Applicants - now the Appellants.

Lemelson completely fails to show any methods for conserving power in a receiver for an unlocking device. As a result, Lemelson suffers from the very same problem that is solved by the present invention – excessive power consumption of an unlocking device.

The Applicants respectfully assert that the Examiner's reliance on Stengel to correct the fails of Lemelson is misplaced. As stated previously, nothing is disclosed in Stengel regarding the applicability of the battery saver for unlocking devices. Thus, the Examiner has failed to establish a *prima facie* case of obviousness.

The mere fact that the cited references can be combined or modified is not sufficient to establish *prima facie* obviousness. *MPEP* 2143.01(III). Here, the references clearly fail to recognize, appreciate, teach, suggest, or show any method for conserving power within an unlocking device as claimed within the application-at-issue. Nevertheless, the Examiner states on page 5 of the Final Office Action that "it is conventionally understood that saving power is desirable in nearly all electronic devices." The Applicants respectfully assert that the Examiner's conclusion is merely hindsight reconstruction of the claimed invention and fails to satisfy the requirement that the prior art, and not the Examiner, must suggest the desirability of the claimed invention.

The Applicants also note that on pages 5-6 of the Final Office Action that the Examiner states that "one cannot show nonobviousness by attacking the references individually were the rejections are based on combinations of references." The Applicants maintain that this language, apparently from paragraph 7.37.13 of MPEP 707.07(f), is incorrectly used by the Examiner.

In contrast to the Examiner's assertion, the Applicants have not been attacking the references individually. Instead, the Applicants have been methodically pointing out why the prior art as a whole does not teach the desirability of the claimed combination. Accordingly, all rejections should be withdrawn and all claims should be passed to issue because the prior art does not teach or suggest the desirability of the claimed combination.

## C. Level of Ordinary Skill in the Art

The level of ordinary skill in the art at the time of the invention should be determined and employed to maintain objectivity in any rejection under 35 U.S.C. § 103. *MPEP* 2141.03. Here, however, the Applicants maintain that the level of ordinary skill in the art was overlooked.

The inventors of the application-at-issue recognized the advantages of conserving power within an unlocking device. In contrast, Lemelson and Stengel failed to recognize the importance of this feature.

For instance, in Lemelson, an unlocking device is disclosed that uses a "<u>suitable</u> source of electrical energy such as a battery or line current, a combination of the two or other means for supplying electrical energy for powering the electronic devices associated with the various components illustrated and described." *Lemelson*, Col. 4, lns. 47-52. (emphasis added). Accordingly, Lemelson indicates that if a battery is not "a suitable source of electrical energy," then instead of trying to save power – a person should just get a bigger or better source of electrical energy. Therefore, Lemelson failed to recognize the desirability of conserving power in an unlocking device.

Turning to Stengel, once again nothing is stated about conserving power within an unlocking device. Instead, Stengel is concerned with a radio receiver that goes to sleep after synchronizing with a signal. Stengel, Col. 5, ln. 66 – Co. 6, ln. 7. Accordingly, Stengel also did not recognize the desirability of the claimed invention.

Nevertheless, the Examiner maintains that "one of ordinary skill in the art recognizes power saving as a solution to the problem and Stengel teaches a method (the claimed method) of saving power in a receiver." *Final Office Action*, p. 5.

However, the objective evidence of record contradicts the Examiner's findings regarding what one of ordinary skill in the art, at the time of the invention, would have been motivated to do. In particular, Lemelson indicates that if a power supply (e.g., a battery) is not a suitable source of electrical power, then instead of trying to conserve power, a line current or other means should be used. Accordingly, one skilled in the art would not be motivated to use Stengel for implementing the power saving features as set forth in the present application for an unlocking device. Thus, all claims in the application-at-issue should be passed to issue because the objective evidence points away from the Examiner's conclusions regarding the ordinary skill in the art at the time of the invention.

### C. All Elements of the Claims

In a proper rejection under 35 U.S.C. § 103, all claim limitations must be taught or suggested by the prior art. MPEP 2143.03. Here, the Examiner has overlooked the

claim language to determine if all claim limitations have been taught or suggested by the prior art. Accordingly, the rejections should be overturned.

All of the words in a claim, not just some of the words, must be considered when judging the patentability of a claim against the prior art. MPEP 2143.03. Otherwise, the wording of the claim becomes meaningless.

In the application-at-issue, all of the claims use wording that, generally stated, requires a circuit to be enabled for an extended time period so an input code can be received via an electromagnetic signal. Also, if the input code matches an access code, then a signal is provided to unlock a device.

In contrast, Lemelson does not teach or suggest enabling a circuit for an extended time period so an input code can be received via an electromagnetic signal wherein, if the input code matches an access code, then a signal is provided to unlock a device. Instead, the receiver circuit in Lemelson is continuously enabled. Therefore, there is no need for Lemelson to devise power saving features wherein, as claimed by the Applicants, a circuit is enabled for different time periods.

Likewise, Stengel does not teach or suggest enabling a circuit for an extended time period so an input code can be received via an electromagnetic signal wherein, if the input code matches an access code, then a signal is provided to unlock a device. Instead, the receiver of Stengel is directed to a radio receiver. Therefore, there is nothing disclosed regarding receiving input codes while a circuit is enabled for an extended time period wherein, if the input code matches an access code, then a signal is provided to unlock a device. Accordingly, all claims in the application-at-issue should be found allowable because Lemelson and Stengel both fail to teach or suggest all limitations of the claims-at-issue.

Moreover, the Applicants respectfully assert that the prior art of record also fails to teach or suggest, among other things: a low-battery indicator, a two-current solenoid driver, reading and writing codes to memory, a keyboard for entering a code, a program key on the keyboard, a serial number written to the memory, and other features as set forth in various dependent claims of the application-at-issue.

For the above reasons, the rejection of claims 1-6, 8-12, 14-20, 22-27, 29, 30, 33-39, 42-48, 51-57 and 60-65 should be overturned.

### Second Ground of Rejection Under 35 U.S.C. § 103(a)

Applicants assert that all claims are allowable over the prior art of record. As previously stated above, Lemelson and Stengel fail to teach or suggest the claims-at-issue. Stamm does not correct this defect.

During prosecution of the application-at-issue, Stamm is only cited as a basis for rejecting dependent claims 7, 13, 21 and 28, and is not used as a basis for rejecting any independent claims. However, since the parent claims are allowable over the prior art as argued above, the dependent claims are allowable as well.

Turning to the disclosure of Stamm, what is taught therein pertains to a battery operated access control card wherein infrared signals can be used. However, unlike what is claimed, Stamm does not teach or suggest using infrared within an unlocking device that is periodically enabled to receive an input code. Accordingly, the rejection of the claims-at-issue should be overturned.

Thus, for the reasons stated above, the rejection of claims 7, 13, 21 and 28 should be overturned.

### Third Ground of Rejection Under 35 U.S.C. § 103(a)

Applicants assert that all claims are allowable over the prior art of record. As previously stated above, Lemelson and Stengel fail to teach or suggest the claims-atissue. The statements by the Applicants that are alleged by the Examiner to be admitted prior art (herein after "the alleged admitted prior art" or "AAPA") fail to correct this defect.

During prosecution of the application-at-issue, the AAPA is only cited as a basis for rejecting dependent claims 31, 32, 40, 41, 49, 50, 58 and 59, and is not used as a basis for rejecting any independent claims. However, since the parent claims are allowable over the prior art as argued above, the dependent claims are allowable as well.

Turning to the AAPA, no teach or suggestion is provided for, as claimed, combining a keypad or program key with a circuit that is enabled for an extended time

period so an input code can be received via an electromagnetic signal wherein, if the input code matches an access code, then a signal is provided to unlock a device. In fact, the AAPA teaches just the opposite by teaching a system that only uses a keyboard instead of both electromagnetic signals and a keyboard. Accordingly, the rejection of the claims-at-issue should be overturned.

Thus, for the reasons stated above, the rejection of claims 31, 32, 40, 41, 49, 50, 58 and 59 should be overturned.

#### VIII APPENDIX OF CLAIMS

The text of the claims involved in the appeal are:

An electronic access control device comprising:
 a circuit having a portion deactivated during a first time period;

the portion of the circuit enabled during a second time period,

the portion of the circuit having an enable output signal generated in response to as sensed electromagnetic signal;

the portion of the circuit being enabled for an extended time period that is greater than the second time period;

the portion of the circuit having an input code output generated in response to the electromagnetic signal and during the extended time period;

a microprocessor having an unlock output signal generated if the input code matches the access code; and

an electromechanical driver having an output signal generated in response to the unlock signal.

- 2. The device of claim 1, the portion of the circuit comprising a wake-up circuit.
- 3. The device of claim 1, the portion of the circuit comprising a receiver.
- 4. The device of claim 1, the portion of the circuit comprising a wake-up circuit and a receiver.
- 5. The device of claim 1, the portion of the circuit comprising an antenna.
- 6. The device of claim 1, further comprising at least one of the following is responsive to the output signal of the electrochemical driver: a solenoid; an electromechanical relay; a DC motor; and, a solid-state relay.
- 7. The device of claim 1, wherein the electromagnetic signal is infrared.

8. The device of claim 1, wherein the electromagnetic signal is within a radio frequency.

## 9. An apparatus comprising:

a first circuit comprising an oscillator and having a first circuit output signal;

a second circuit enabled and disabled in response to the first circuit output signal, the second circuit having a second circuit output signal generated in response to receipt of an electromagnetic signal;

a third circuit temporarily enabled during the receipt of the electromagnetic signal, the circuit having a third circuit output signal comprising an input code generated in response to receipt of an electromagnetic signal;

a fourth circuit temporarily enabled to compare the input code to an access code; and,

an electromechanical driver having an output that is provided to an unlock device if the input code matches the access code.

- 10. The apparatus of claim 9, the first and second circuits comprising a wake-up circuit.
- 11. The apparatus of claim 9, the third circuit comprising a decode circuit.
- 12. The apparatus of claim 9, the unlock device comprising at least one of the following: a solenoid; an electromechanical relay; a DC motor; and, a solid-state relay.
- 13. The apparatus of claim 9, wherein the electromagnetic signal is infrared.
- 14. The apparatus of claim 9, wherein the electromagnetic signal is within a radio frequency.
- 15. An apparatus comprising:

an oscillator having an output comprising a plurality of duty cycles; a circuit that is periodically enabled for a time  $t_1$  and disabled for a time  $t_2$  during

at least some of the duty cycles;

a portion of the circuit that generates an input code in response to an electromagnetic signal;

a microprocessor that compares the input code to an access code;

a switch that enables the portion of the circuit as the input code is being received for a time  $t_3$  that is greater than the time  $t_1$ .

- 16. The apparatus of claim 15, wherein the portion of the circuit is a decoder.
- 17. The apparatus of claim 15, wherein the switch is responsive to an override signal generated by the decoder.
- 18. The apparatus of claim 15 further comprising an unlock device responsive to an unlock signal generated by the microprocessor.
- 19. The apparatus of claim 18, the unlock device comprising at least one of the following: a solenoid; an electromechanical relay; a DC motor; and, a solid-state relay.
- 20. The apparatus of claim 15 further comprising an electromechanical driver electrically connected to the microprocessor and an unlock device.
- 21. The apparatus of claim 15, wherein the electromagnetic signal is infrared.
- 22. The apparatus of claim 15, wherein the electromagnetic signal is within a radio frequency.
- 23. A circuit operating on current drained from a batter comprising:
  an electronic circuit having an output that indicates detection of a device capable of providing an electromagnetic signal;

a decoder that extracts an input code transmitted via the electromagnetic signal; a switch that, in response to an input, increases the current drained from the battery;

an electronic circuit that compares the input code to an access code; an electronic circuit that provides an output to an unlock device if the input code matches the access code; and,

wherein the switch decreases the current drained from the battery after receiving the input code.

- 24. The circuit of claim 23, the electronic circuit that provides the output to the unlock device comprises a microprocessor.
- 25. The circuit of claim 23, the electronic circuit that provides the output to the unlock device comprising an electromechanical driver.
- 26. The circuit of claim 23, the circuit that compares the input code to an access code comprising a microprocessor.
- 27. The circuit of claim 23, the unlock device comprising at least one of the following: a solenoid; an electromechanical relay; a DC motor; and, solid-state relay.
- 28. The circuit of claim 23, wherein the electromagnetic signal is infrared.
- 29. The circuit of claim 23, wherein the electromagnetic signal is within a radio frequency.
- 30. The device of claim 1 wherein the microprocessor is periodically enabled.
- 31. The device of claim 1 further comprising a keypad operatively connected to the microprocessor.

- 32. The device of claim 1 further comprising a program key operatively connected to the microprocessor.
- 33. The device of claim 1 further comprising a low-battery detection circuit enabled by the microprocessor for measuring a battery voltage, and wherein the low-battery detection circuit is disabled during the first time period.
- 34. The device of claim 1 wherein the electromechanical driver has a first state and a second state, the driver output signal providing a higher non-zero power output in the first state than in the second state, and a timer for triggering a transition from the first state to the second state.
- 35. The device of claim 1 further comprising a communication port operatively connected to the microprocessor for sending the access code to the microprocessor that is written into a memory.
- 36. The device of claim 35 wherein the microprocessor is programmed to receive a serial number for the device through the communication port and write the serial number into the memory.
- 37. The device of claim 36 wherein the microprocessor transmits the serial number through the communication port.
- 38. The device of claim 1 further comprising a communication port operatively connected to the microprocessor, and wherein the microprocessor is programmed to transmit the access code through the communication port.
- 39. The apparatus of claim 9, the fourth circuit comprising a microprocessor.
- 40. The apparatus of claim 9 further comprising a keypad operatively connected to the fourth circuit comprising a microprocessor.

- 41. The apparatus of claim 9, the fourth circuit comprising a microprocessor and a program key operatively connected to the microprocessor.
- 42. The apparatus of claim 9, the fourth circuit comprising a microprocessor and a low-battery detection circuit enabled by the microprocessor for measuring a battery voltage, and wherein the low-battery detection circuit is periodically disabled and enabled.
- 43. The apparatus of claim 9, the fourth circuit comprising a microprocessor and wherein the electromechanical driver has a first state and a second state, the driver output providing a higher non-zero power output in the first state than in the second state, and a timer for triggering a transition from the first state to the second state.
- 44. The apparatus of claim 9, the fourth circuit comprising a microprocessor having a communication port for sending an access code to the microprocessor that is written into a memory.
- 45. The apparatus of claim 44 wherein the microprocessor is programmed to receive a serial number through the communication port and write the serial number into the memory.
- 46. The apparatus of claim 45 wherein the microprocessor transmits the serial number through the communication port.
- 47. The apparatus of claim 9, the fourth circuit comprising a microprocessor having a communication port operatively connected thereto, and wherein the microprocessor is programmed to transmit the access code through the communication port.
- 48. The apparatus of claim 15 wherein the microprocessor is periodically enabled.

- 49. The apparatus of claim 15 further comprising a keypad operatively connected to the microprocessor.
- 50. The apparatus of claim 15 further comprising a program key operatively connected to the microprocessor.
- 51. The apparatus of claim 15 further comprising a low-battery detection circuit enabled by the microprocessor for measuring a battery voltage, and wherein the low-battery detection circuit is periodically disabled and enabled.
- 52. The apparatus of claim 15 further comprising an electromechanical driver operatively connected to the microprocessor, the driver having a first state and a second state, and an output signal providing a higher non-zero power output in the first state than in the second state, and a timer for triggering a transition from the first state to the second state.
- 53. The device of claim 15 further comprising a communication port operatively connected to the microprocessor for sending the access code to the microprocessor that is written into a memory.
- 54. The device of claim 53 wherein the microprocessor is programmed to receive a serial number for the device through the communication port and write the serial number into the memory.
- 55. The device of claim 54 wherein the microprocessor transmits the serial number through the communication port.
- 56. The device of claim 15 further comprising a communication port operatively connected to the microprocessor, and wherein the microprocessor is programmed to transmit the access code through the communication port.

- 57. The device of claim 23, the electronic circuit that compares the input code to the access code comprising a microprocessor that is periodically enabled.
- 58. The circuit of claim 23 further comprising a keypad operatively connected to the comparing circuit comprising a microprocessor.
- 59. The circuit of claim 23, the comparing circuit comprising a microprocessor and a program key operatively connected to the microprocessor.
- 60. The circuit of claim 23, the comparing circuit comprising a microprocessor and a low-battery detection circuit enabled by the microprocessor for measuring a voltage associated with the battery, and wherein the low-battery detection circuit is periodically disabled and enabled.
- 61. The circuit of claim 23, the comparing circuit comprising a microprocessor and wherein the circuit providing the output to the unlock device comprising an electromechanical driver having a first state and a second state, the driver output providing a higher non-zero power output in the first state than in the second state, and a timer for triggering a transition from the first state to the second state.
- 62. The circuit of claim 23, the comparing circuit comprising a microprocessor having a communication port for sending the access code to the microprocessor that is written into a memory.
- 63. The circuit of claim 62 wherein the microprocessor is programmed to receive a serial number through the communication port and write the serial number into the memory.
- 64. The circuit of claim 63 wherein the microprocessor transmits the serial number through the communication port.

65. The circuit of claim 23, the comparing circuit comprising a microprocessor having a communication port operatively connected thereto, and wherein the microprocessor is programmed to transmit the access code through the communication port.

Date: June 22, 2006

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